

July 29, 1946.

Dear Dr. Roepke,

Dr. Tatum has just shown me a manuscript of your Letter on your pab-less mutant. This was of special interest to me because I'd just finished isolating and testing two different pab-less strains. One, Y9, is an X-ray mutant in the threonine-leucineless strain 679-680. It grows very nicely on pab, or ~~pab~~ methionine + hydrolysed yeast nucleic ac. Y44 is an ultraviolet mutant in a histidineless strain (Y39, obtained from B/r different from both K-12 and L-15) which again grows well on pab, but shows no trace of response to methionine + yna. I should be very much interested to determine, by syntrophism, whether your strain is blocked at a step different from these two. Would you be amenable to sending us a culture?

When I visited your lab last May, I was very much intrigued by your mutant 'switch' (from lysine to thiamin as I remember) Have you done anything more with this? I am rather more of a geneticist than a chemist and that sort of problem is of greater concern to me than say, pab synthesis.

From Dr. Lampen's letter to ELT about 'syntrophism' I gather that you have gotten it to work. Glad to hear that. That may mean that the uracil-citrulline mutation involves an inhibition as well as or instead of a simple biochemical block, does it not, from the previous results you mentioned to me using that mutant?

I would appreciate very much reprints of your papers as they appear.

Sincerely yours,

Joshua Lederberg.